# VALLEY VIEW UNIVERSITY

# INSTITUTE OF COMPUTER SCIENCE



Project Title: Valley View University online information technology discussion forum (VVUITF)

By

**VVUITF Team** 

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Working Title of Project	Valley View University online Information Technology Discussion Forum
Project Sponsors	Joseph Abandoh-Sam
Date of Delivery	25 <sup>th</sup> April, 2017
Nature of Deliverable	Github (https://github.com/jaysin19/valley-view-university-information-technology-discussion-forum)
URL for project	http://vvuitf.netii.net
Project Type	■ New Project

## Valley View University Information Technology Discuss-Forum

### **Abstract**

The project titled "Valley-View-University-Information Technology forum" is designed using PHP 5.2 as front end and MySQL 3.23.41 as back end. The coding language used is PHP.

This project is aimed at developing online Information technology forum for the group discussion between CS and IT students of Valley View University. This is a web-based tool. Any registered user can post their doubts on topics related to Information Technology and can reply for the other user doubts. The user can also query for information using the Wikipedia API search tool. The user can also generate a report on all technical discussions made in the forum. This is useful for a small office, school or a department or for that matter any group who is interested to organize it effectively. Facility to share the resource and post articles that can be viewed by registered user.

## Functional components of the project

Following is a list of functionality of the system. More functionality that you find appropriate can be added to this list. And, in places where the description of functionality is not adequate, you can make appropriate assumptions and proceed.

#### Users of the system:

Following are the requirements, which can be used to derive functional components:

- 1. Users need to register.
- 2. Facility to post topics for the discussion.
- 3. Facility to view the questions by topics
- 4. User to reply to questions posted by other users
- 5. Users can exchange messages with both Admin and other users
- 6. User to like all questions and comments posted by himself and other users
- 7. User to search for information using the Wikipedia Search API
- 8. User to download specific questions including their corresponding comments in a PDF format
- 9. Admin to insert topics dynamically for discussion
- 10. Admin to answer queries from questions posted by user.
- 11. Admin can exchange messages to other users.
- 12. Administrator has privilege to accept user or delete user account and user questions and answers.

#### 1.1 PROJECT DESCRIPTION

The project titled "VALLEY VIEW UNIVERSITY INFORMATION TECHNOLOGY FORUM" is designed using using PHP 5.2 as front end and MySQL 3.23.41 as back end in Microsoft Windows Operating System family.

The project contains seven main modules.

- Category
- Post Question
- Registration
- Answer
- Topic
- Subtopic
- Wikipedia Search

#### **Category Module:**

This module is the main module, by selecting the category user can post their questions easily. They can retrieve the answers for their questions from the different users.

#### **Post Question Module:**

This module is mainly for the registered users. As the Administrator has to know who has posted the questions the user is registered here. These registered users alone can post their question in detailed manner.

#### **Registration Module:**

This Module helps to give the detailed information about the newly entered user.

#### **Answer Module:**

Each and every posted question will get the exact answer from the Discussion Forum team and also they can get a lot of answers from the different user.

#### **Topic Module:**

Admin can categorically insert topics relevant for discussion.

#### **Sub-Topic Module:**

Admin can insert sub-topics that fall under various topics for discussion.

#### Wikipedia Search Module

This module is used to search queries and articles using a Wikipedia Search Engine . Only registered users can search over here.

#### 2. SYSTEM STUDY

#### 2.1 FEASIBILITY STUDY:

The feasibility of the project is analyzed in this phase and business proposal is put forth with a very general plan for the project and some cost estimates. During system analysis the

feasibility study of the proposed system is to be carried out. This is to ensure that the proposed system is not a burden to the team. For feasibility analysis, some understanding of the major requirements for the system is essential.

Three key considerations involved in the feasibility analysis are

- SOCIAL FEASIBILITY

#### **ECONOMICAL FEASIBILITY**

This study is carried out to check the economic impact that the system will have on the Institution. The amount of fund that the VVUITF team can pour into the research and development of the system is limited. The expenditures must be justified. Thus the developed system fell within the budget and this was achieved because most of the technologies used are freely available. Only the customized products had to be purchased.

#### TECHNICAL FEASIBILITY

This study is carried out to check the technical feasibility, that is, the technical requirements of the system. Any system developed must not have a high demand on the available technical resources. This will lead to high demands on the available technical resources. This will lead to high demands being placed on the client. The developed system must have a modest requirement, as only minimal or null changes are required for implementing this system.

#### **SOCIAL FEASIBILITY**

The aspect of study is to check the level of acceptance of the system by the user. This includes the process of training the user to use the system efficiently. The user must not feel threatened by the system, instead must accept it as a necessity. The level of acceptance by the users solely depends on the methods that are employed to educate the user about the system and to make him familiar with it. His level of confidence must be raised so that he is also able to make some constructive criticism, which is welcomed, as he is the final user of the system.

#### 2.1 EXISTING SYSTEM

In general people share their ideas, queries and answers from their colleagues or friends through the intercom or direct manner. They need to spend time for their work.

#### DRAWBACKS

Some of the drawbacks are:

- 1. Details are enquired through phone.
- 2. It consumes more time
- 3. They don't get proper answers.

#### 2.2 PROPOSED SYSTEM

It is difficult to note down all the problems manually. Instead it is decided to develop an "ONLINE DISCUSSION FORUM" to ease the operation.

A system is required which is being capable of elimination all the problems and become useful to users and thus the new system is derived. Here we get a different view from different users.

#### **BENEFITS**

- 1. Interaction will be easier.
- 2. Users questions can be viewed by others
- 3. Less time consuming.

#### 3. SYSTEM SPECIFICATION

### 3.1 HARDWARE REQIUREMNTS

The hardware used for the development of the project is:

PROCESSOR : PENTIUM III 866 MHz

RAM : 128 MD SD RAM

MONITOR : 15" COLOR

HARD DISK : 20 GB

FLOPPY DRIVE : 1.44 MB

CD DRIVE : LG 52X

KEYBOARD : STANDARD 102 KEYS

MOUSE : 3 BUTTONS

### 3.2 SOFTWARE REQIUREMNTS

The software used for the development of the project is:

OPERATING SYSTEM : Windows XP Professional

ENVIRONMENT : PHP 5.0 (XAMP)

LANGUAGE : PHP

BACKEND : MySQL 3.23.41

#### 4 SYSTEM DESIGN

Design is multi-step process that focuses on data structure software architecture, procedural details, (algorithms etc.) and interface between modules. The design process also translates the requirements into the presentation of software that can be accessed for quality before coding begins.

Computer software design changes continuously as new methods; better analysis and broader understanding evolved. Software Design is at relatively early stage in its revolution.

Therefore, Software Design methodology lacks the depth, flexibility and quantitative nature that are normally associated with more classical engineering disciplines. However techniques for software designs do exist, criteria for design qualities are available and design notation can be applied.

#### 4.1 INPUT DESIGN

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Input design is the process of converting user-originated inputs to a computer-based format. Input design is one of the most expensive phases of the operation of computerized system and is often the major problem of a system.

In the project, the input design is made in various web forms with various methods.

For example, in the Admin form, the empty username and password is not allowed. The username if exists in the database, the input is considered to be invalid and is not accepted.

#### **4.2 OUTPUT DESIGN**

Output design generally refers to the results and information that are generated by the system for many end-users; output is the main reason for developing the system and the basis on which they evaluate the usefulness of the application.

In the project, once question are posted, It stores in to the database. The questions are viewed and also the user who needs the details about the question can register and see the related answer which is to be posted this site.

### 4.3 DATABASE DESIGN

The database design is a must for any application developed especially more for the data store projects. Since the chatting method involves storing the message in the table and produced to the sender and receiver, proper handling of the table is a must.

In the project, login table is designed to be unique in accepting the username and the length of the username and password should be greater than zero.

The complete listing of the tables and their fields are provided in the annexure under the title 'Table Structure'.

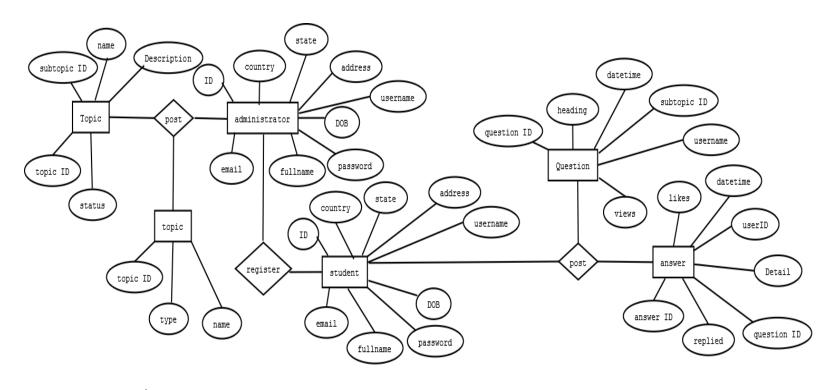
#### **MODULE:**

Modules are units of code written in access basic language. We can write and use module to automate and customize the database in very sophisticated ways.

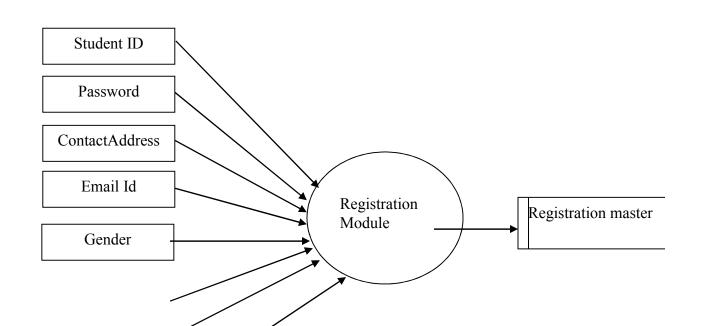
It is a personal computer based RDBMS. This provides most of the features available in the high-end RDBMS products like Oracle, Sybase, and Ingress etc. VB keeps access as its native database. Developer can create a database for development & further can create.

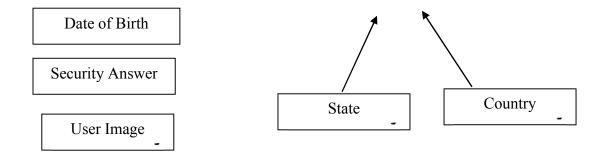
The tables are required to store data. During the initial Development phase data can be stored in the access database & during the implementation phase depending on the volume data can use a higher – end database.

### **ER DIAGRAM**

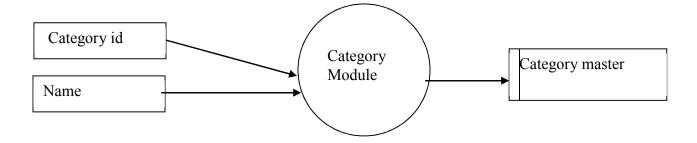


## **5.1 DATA FLOW DIAGRAM**

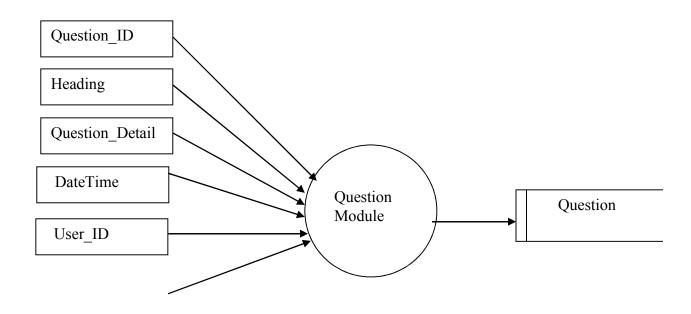




## **Category Module**

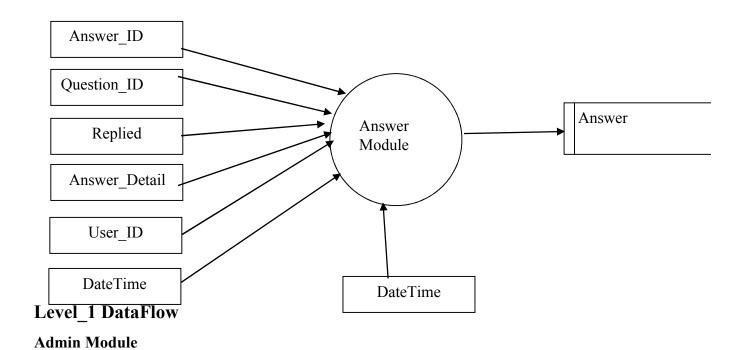


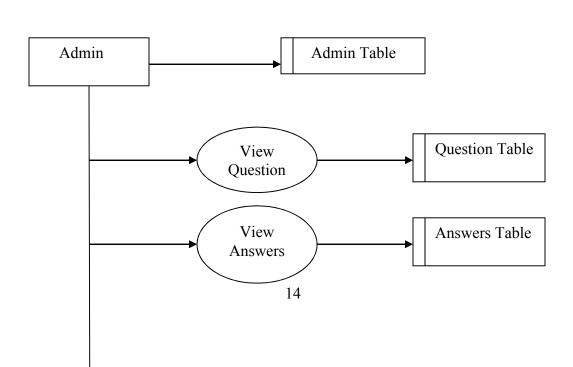
## **Post Question Module**

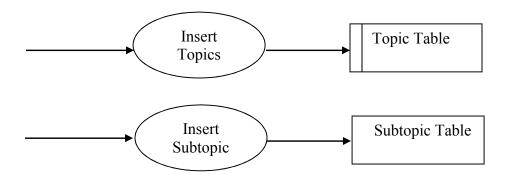




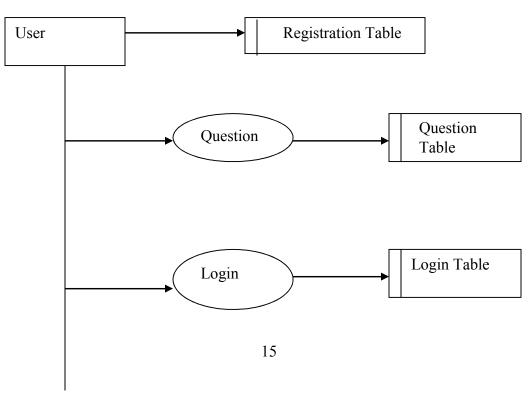
### **Answer Module**



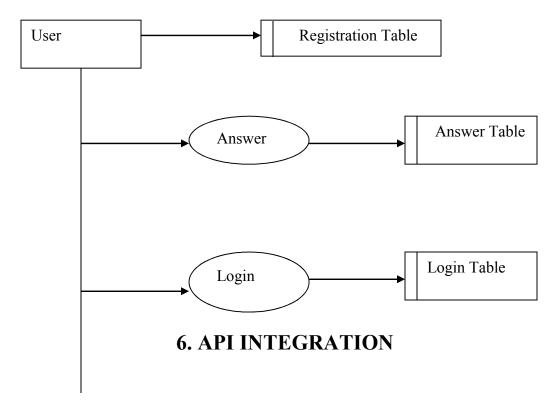




## Question



#### **Answer Module**



#### 6. 1 WIKIPEDIA API

The Wikipedia API was integrated into the VVUITF web application to allow users access information from Wikipedia. Because Wikipedia is built using MediaWiki, which in turn supports an API, Wikipedia does as well. This provides developers code-level access to the entire Wikipedia reference. The goal of this API is to provide direct, high-level access to the data contained in the MediaWiki databases. Client programs such the VVUITF web application can use the API to get data. The API uses RESTful calls and supports a wide variety of formats including XML, JSON, PHP.

#### 7. SYSTEM TESTING AND MAINTENANCE

#### 7.1 UNIT TESTING

The procedure level testing is made first. By giving improper inputs, the errors occurred are noted and eliminated. Then the web form level testing is made. For example storage of data to the table in the correct manner.

The dates are entered in wrong manner and checked. Wrong email-id and web site URL (Universal Resource Locator) is given and checked.

#### 7.2 INTEGRATION TESTING

Testing is done for each module. After testing all the modules, the modules are integrated and testing of the final system is done with the test data, specially designed to show that the system will operate successfully in all its aspects conditions. Thus the system testing is a confirmation that all is correct and an opportunity to show the user that the system works.

#### 7.3 VALIDATION TESTING

The final step involves Validation testing, which determines whether the software function as the user expected. The end-user rather than the system developer conduct this test most software developers as a process called "Alpha and Beta Testing" to uncover that only the end user seems able to find.

The compilation of the entire project is based on the full satisfaction of the end users. In the project, validation testing is made in various forms. In registration form Email id, phone number and also mandatory fields for the user is verified.

#### 7.4 VERIFICATION TESTING

Verification is a fundamental concept in software design. This is the bridge between customer requirements and an implementation that satisfies those requirements.

This is verifiable if it can be demonstrated that the testing will result in an implementation that satisfies the customer requirements.

Inadequate testing or non-testing leads to errors that may appear few months later. This will create two problems

- ✓ Time delay between the cause and appearance of the problem.
- ✓ The effect of the system errors on files and records within the system.

#### **MAINTENANCE**

The objectives of this maintenance work are to make sure that the system gets into work all time without any bug. Provision must be for environmental changes which may affect the computer or software system. This is called the maintenance of the system. Nowadays there is the rapid change in the software world. Due to this rapid change, the system should be capable of adapting these changes. In our project the process can be added without affecting other parts of the system.

Maintenance plays a vital role. The system liable to accept any modification after its implementation. This system has been designed to favor all new changes. Doing this will not affect the system's performance or its accuracy.

#### 8. SYSTEM IMPLEMENTATION

Implementation is the most crucial stage in achieving a successful system and giving the user's confidence that the new system is workable and effective. Implementation of a modified application to replace an existing one. This type of conversation is relatively easy to handle, provide there are no major changes in the system.

Each program is tested individually at the time of development using the data and has verified that this program linked together in the way specified in the programs specification, the computer system and its environment is tested to the satisfaction of the user. The system that has been developed is accepted and proved to be satisfactory for the user. And so the system is going

to be implemented very soon. A simple operating procedure is included so that the user can understand the different functions clearly and quickly.

Initially as a first step the executable form of the application is to be created and loaded in the common server machine which is accessible to all the user and the server is to be connected to a network

#### 7.1 SCOPE FOR FUTURE DEVELOPMENT

Every application has its own merits and demerits. The project has covered almost all the requirements. Further requirements and improvements can easily be done since the coding is mainly structured or modular in nature. Changing the existing modules or adding new modules can append improvements. Further enhancements can be made to the application, so that the web site functions very attractive and useful manner than the present one.

#### 8. CONCLUSION

It is concluded that the application works well and satisfy the both registered and registered. The application is tested very well and errors are properly debugged. The site is simultaneously accessed from more than one system.

The site works according to the restrictions provided in their respective browsers. The speed of the transactions become more enough now. In this site the user can search the appropriate answers for their questions. They can view their favorable questions and corresponding answers respectfully.

## **Appendix:**

### **SCREEN SHOTS**

